

REMARKS

Claims 1-12 are pending and under consideration in the above-identified application.

In the Office Action of March 31, 2010, claims 1-12 were rejected. In the Appeals Decision of September 24, 2010, the Appeals Board reversed the Examiner's rejection of claims 1-12 in view of Inoue.

With this amendment, claims 1, 2, 7 and 8 are amended and claims 6 and 12 are cancelled.

I. 35 U.S.C. § 103 Obviousness Rejections of the Claims

1. Claims 1-12 were rejected under 35 U.S.C. 102(b)/103(a) as being anticipated by, and alternatively, unpatentable over Kawakami et al. (U.S. Pat. No. 6,432,585) ("Kawakami").

Claims 1, 3-7 and 9-12 were rejected under 35 U.S.C. 102(b)/103(a) as being anticipated by, and alternatively, unpatentable over Suzuki et al. (U.S. Pat. No. 6,413,672) ("Suzuki 672").

Claims 1, 3-7 and 9-12 were rejected under 35 U.S.C. 102(b)/103(a) as being anticipated by, and alternatively, unpatentable over Suzuki et al. (U.S. Pat. No. 6,171,725) ("Suzuki 725").

Applicant respectfully traverses the rejections.

In relevant part, each of the independent claims 1 and 7 now recite a base material including tin (Sn) and at least one element selected from the group including cobalt (Co) and iron (Fe) and a mass ratio of the carbonaceous material in the composite material is within a range of 0.1 to 8.0 inclusive relative to 100 for the base material.

With this amendment claims 6 and 12 are cancelled. Accordingly, the rejections are moot as to those claims.

This is clearly unlike Kawakami, Suzuki 672 and Suzuki 725 which fail to disclose or even fairly suggest a base material including tin (Sn) and at least one element selected from the group including cobalt (Co) and iron (Fe) and a mass ratio of the carbonaceous material in the composite material is within a range of 0.1 to 8.0 inclusive relative to 100 for the base material. Instead, Kawakami discloses alloying tin with "one or more of the elements selected from the group consisting of Sb, Bi, Pb, Ni, Cu, Ag and Zn" without disclosing anything pertaining to a mass ratio of a carbonaceous material to a base material. See, U.S. Pat. No. 6,432,585, Col. 16, l. 1-12. Suzuki 672 discloses a base material consisting of 28 parts by weight of polycrystalline silicon powder that is mixed with 7 parts by weight of graphite. See, U.S. Pat. No. 6,413,672, Col. 8, l. 6-44. Suzuki 725 discloses a base material consisting of silicon 30-90 percent by weight that is mixed with carbon 10 to 70 percent by weight. See, U.S. Pat. No. 6,171,725, Col. 3, l. 23-38. These references cannot be fairly viewed as disclosing a base material including tin

and one of cobalt and iron where the mass ratio of a carbonaceous material between 0.1 to 8.0 relative to 100 of the base material because none of the references disclose the base material having tin along with cobalt or iron. In addition, none of the references disclose a mass ratio of the carbon in relation to the base material.

As the Applicants specification teaches, by providing a base material including tin (Sn) and at least one element selected from the group including cobalt (Co) and iron (Fe) and a mass ratio of the carbonaceous material in the composite material is within a range of 0.1 to 8.0 inclusive relative to 100 for the base material, the capacity retention of the battery is increased. Sec, Specification at Page 21.

Therefore, because Kawakami, Suzuki 672, Suzuki 725 or any possible combination of them fail to disclose or even fairly suggest every limitation of claims 1 and 7, the rejection of claims 1 and 7 cannot stand. Because claims 2-5 and 8-11 depend, either directly or indirectly, from claims 1 and 7, they are allowable for at least the same reasons.

Conclusion

It is respectfully submitted that a full and complete response has been made to the outstanding Office Action and, as such, there being no other objections or rejections, this application is in condition for allowance, and a notice to this effect is earnestly solicited.

If any further fees are required in connection with the filing of this amendment, please charge the same to our Deposit Account No. 19-3140.

Respectfully submitted,

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